The Big 3 of Workers' Compensation

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PRESENTED
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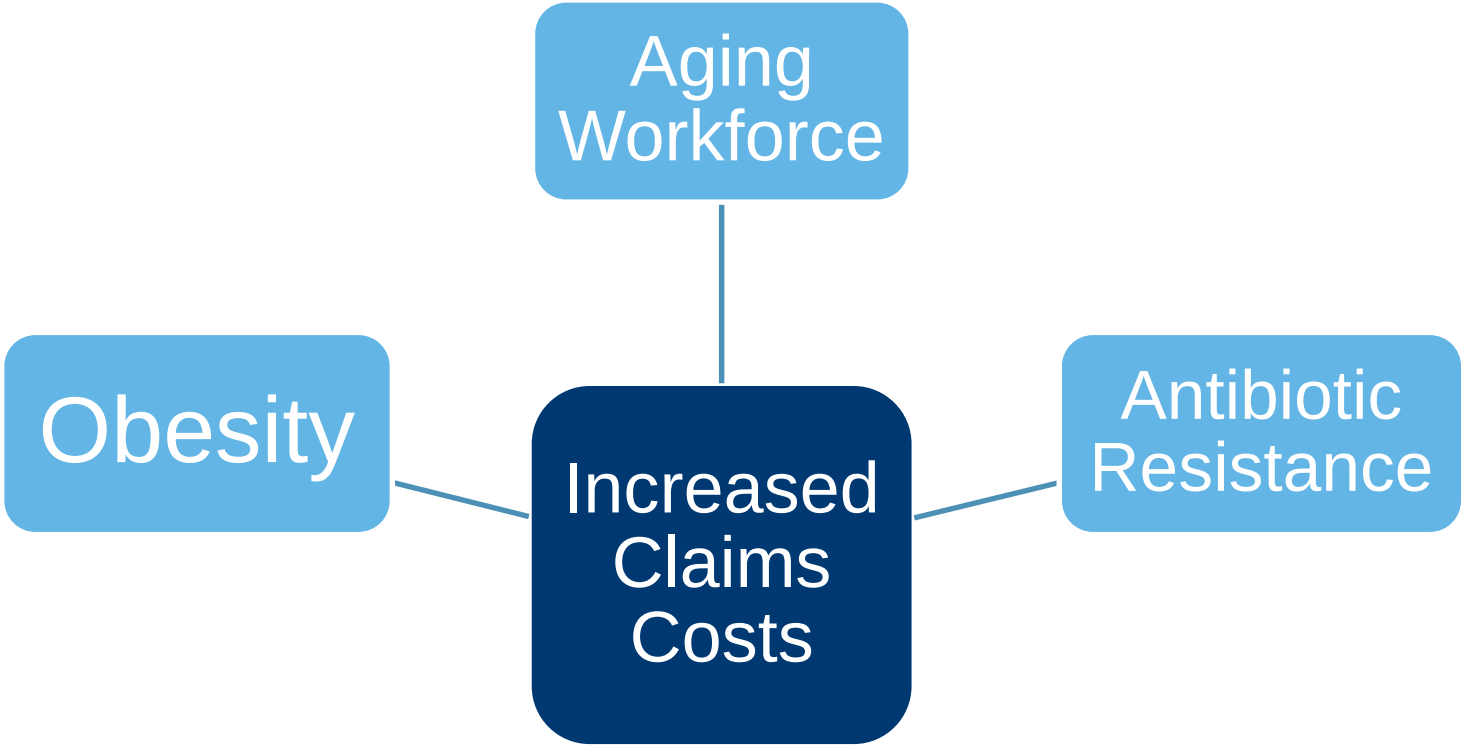
Agenda

- Discuss level of medical care and treatment needed, the increased costs associated and how co-morbidities adversely affect recovery and indemnity benefits
- Identify needs of the obese/overweight worker, the aged worker and the injured worker with significant co-morbidities
- Understand increased recovery times for better return to work planning based on injury, age and adverse factors
- Review case studies to learn to expect the unexpected

The Big Three

The Big Three



Obesity

Obesity: Then & Now

1950: 10%

2018: 36%

Source: Overweight & Obesity. Retrieved from https://www.cdc.gov/obesity/data/adult.html

Complex Injuries

- Head Injuries
- Spinal Cord Injuries
- Amputations
- Spinal Fusion Surgeries
- Multiple Fractures
- Pelvic Fractures
- Crush Injuries
- Burns
- Upper & Lower Extremity Injuries

Complicating Factors

- Diabetes
- Obesity
- Circulatory Disorders
- Cardiac Conditions
- Hypertension
- Neurological Abnormalities
- Age
- Infection
- Home Environment
- Home Support

Obesity

- Body Mass Index (BMI) of 30 or higher. Body Mass Index (BMI): A measure of an adult's weight in relation to his or her height, specifically the adult's weight in kilograms divided by the square of his or her height in meters.

Source: Defining Adult Overweight and Obestity. (2016, June 16). Retrieved from https://www.cdc.gov/obesity/adult/defining.html

Obesity is a leading Preventable Cause of Death worldwide, with increasing prevalence in adults and children

Public Health Officials view it as one of the most serious public health problems of the 21st century

In June of 2013 the AMA declared Obesity as a disease and no longer a comorbidity

Source: Defining Adult Overweight and Obestity. (2016, June 16). Retrieved from https://www.cdc.gov/obesity/adult/defining.html
Source: Pollack, A. (2013, June 18). AMA. Recognizes Obesity as a Disease. Retrieved from https://www.nytimes.com/2013/06/19/business/ama-recognizes-obesity-as-a-disease.html

BMI Ranges: Normal, Obese & Morbidly Obese

- Normal Healthy BMI: 18.2 - 25
- Obese Class I: 30.00 – 34.99
- Obese Class II: 35.00 – 39.99
- Obese Class III: 40.00 or higher (Morbidly Obese)

Source: Hawntsuda. (2015, June 18). AMA. Recognizes Obesity as a Disease. Retrieved from https://www.nytimes.com/2013/06/19/business/ama-recognizes-obesity-as-a-disease.html

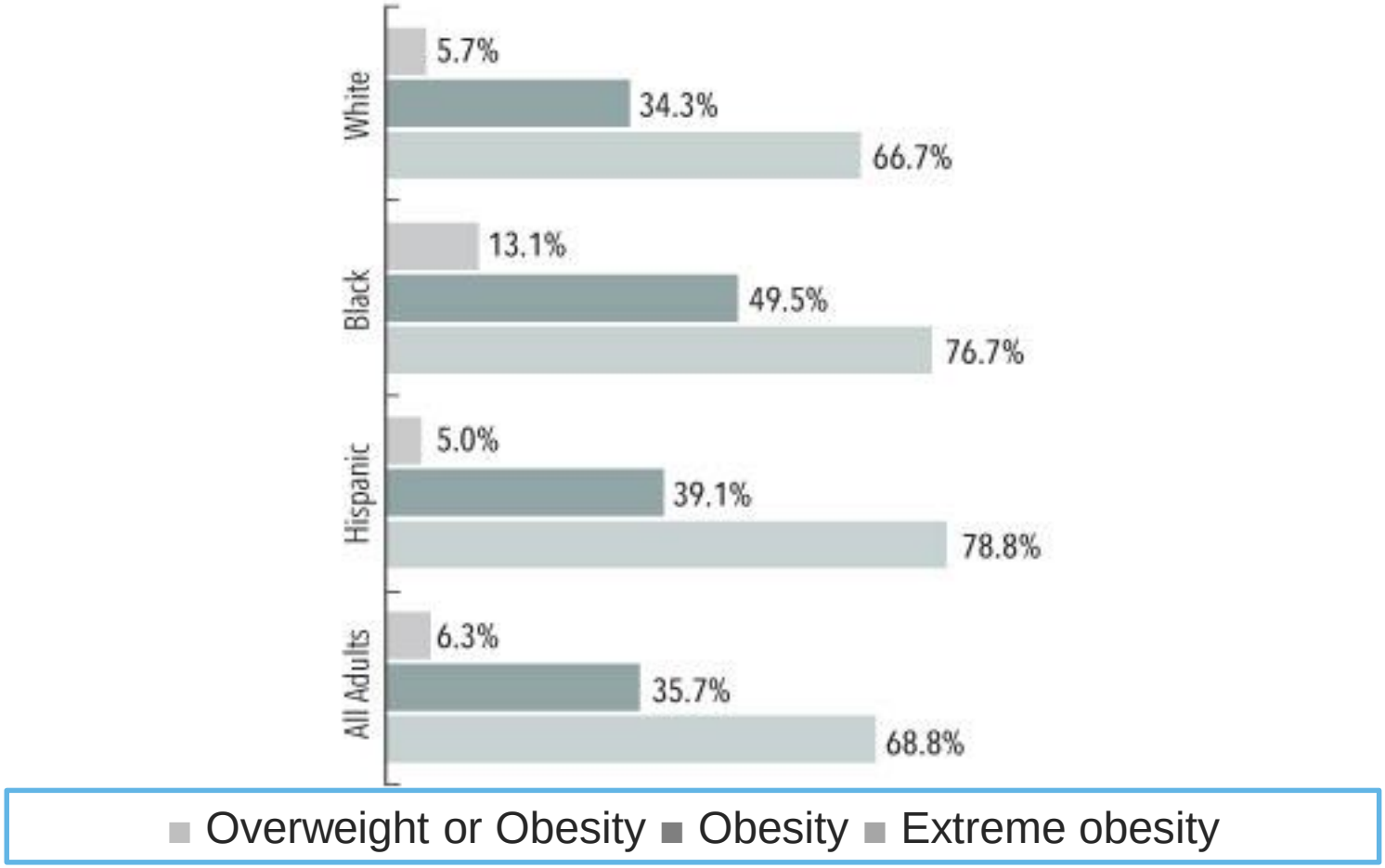
Obesity Fast Facts

More than **1 in 3** adults are considered to be obese

More than **1 in 20** adults are considered to have extreme obesity

Source: NIH. Retrieved from https://www.niddk.nih.gov/health-information/health-statistics/overweight-obesity

Overweight and Obesity among adults age 20 and older, US, 2009–2010 (Estimated Percentage by Race/Ethnicity*)



Source: Adapted from '*Clinical Guidelines on Identification, Evaluation and Treatment of overweight and obesity in Adults: The Evidence Report.'*

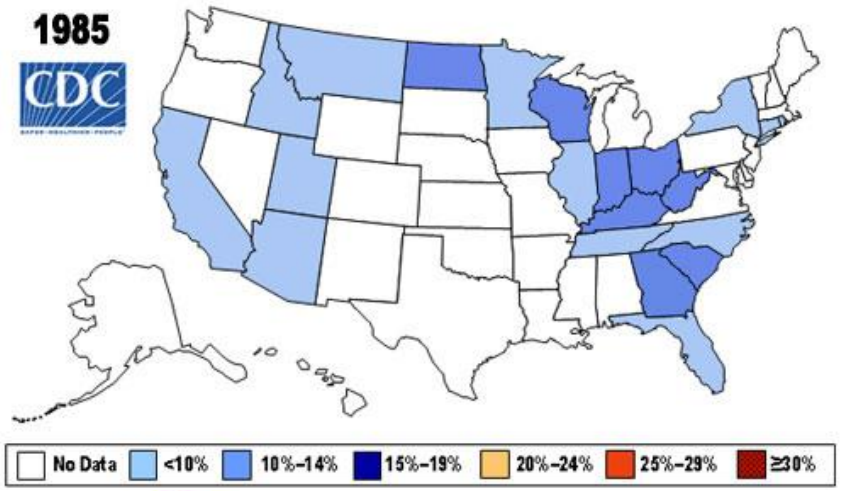
BMI Table

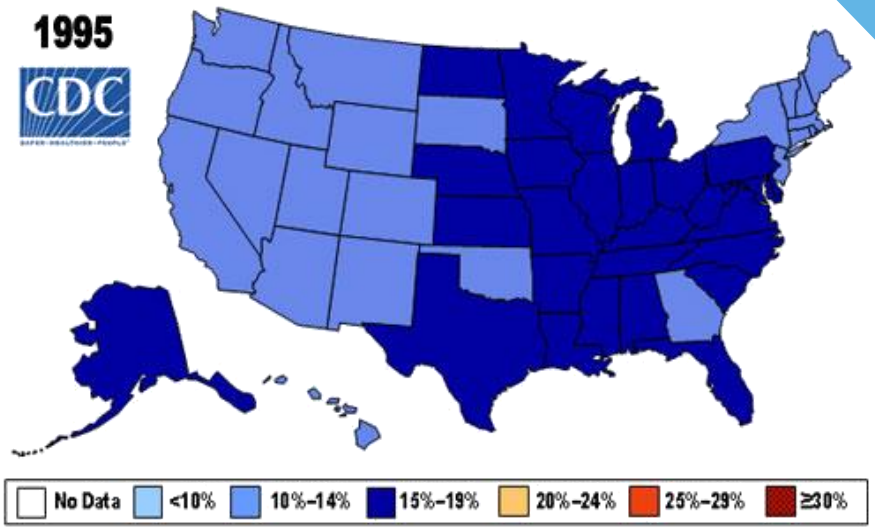
BMI	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54
Height (inches)	Body Weight (pounds)																																			
58	91	96	100	105	110	115	119	124	129	134	138	143	148	153	158	162	167	172	177	181	186	191	196	201	205	210	215	220	224	229	234	239	244	248	253	258
59	94	99	104	109	114	119	124	128	133	138	143	148	153	158	163	168	173	178	183	188	193	198	203	208	212	217	222	227	232	237	242	247	252	257	262	267
60	97	102	107	112	118	123	128	133	138	143	148	153	158	163	168	174	179	184	189	194	199	204	209	215	220	225	230	235	240	245	250	255	261	266	271	276
61	100	106	111	116	122	127	132	137	143	148	153	158	164	169	174	180	185	190	195	201	206	211	217	222	227	232	238	243	248	254	259	264	269	275	280	285
62	104	109	115	120	126	131	136	142	147	153	158	164	169	175	180	186	191	196	202	207	213	218	224	229	235	240	246	251	256	262	267	273	278	284	289	295
63	107	113	118	124	130	135	141	146	152	158	163	169	175	180	186	191	197	203	208	214	220	225	231	237	242	248	254	259	265	270	278	282	287	293	299	304
64	110	116	122	128	134	140	145	151	157	163	169	174	180	186	192	197	204	209	215	221	227	232	238	244	250	256	262	267	273	279	285	291	296	302	308	314
65	114	120	126	132	138	144	150	156	162	168	174	180	186	192	198	204	210	216	222	228	234	240	246	252	258	264	270	276	282	288	294	300	306	312	318	324
66	118	124	130	136	142	148	155	161	167	173	179	186	192	198	204	210	216	223	229	235	241	247	253	260	266	272	278	284	291	297	303	309	315	322	328	334
67	121	127	134	140	146	153	159	166	172	178	185	191	198	204	211	217	223	230	236	242	249	255	261	268	274	280	287	293	299	306	312	319	325	331	338	344
68	125	131	138	144	151	158	164	171	177	184	190	197	203	210	216	223	230	236	243	249	256	262	269	276	282	289	295	302	308	315	322	328	335	341	348	354
69	128	135	142	149	155	162	169	176	182	189	196	203	209	216	223	230	236	243	250	257	263	270	277	284	291	297	304	311	318	324	331	338	345	351	358	365
70	132	139	146	153	160	167	174	181	188	195	202	209	216	222	229	236	243	250	257	264	271	278	285	292	299	306	313	320	327	334	341	348	355	362	369	376
71	136	143	150	157	165	172	179	186	193	200	208	215	222	229	236	243	250	257	265	272	279	286	293	301	308	315	322	329	338	343	351	358	365	372	379	386
72	140	147	154	162	169	177	184	191	199	206	213	221	228	235	242	250	258	265	272	279	287	294	302	309	316	324	331	338	346	353	361	368	375	383	390	397
73	144	151	159	166	174	182	189	197	204	212	219	227	235	242	250	257	265	272	280	288	295	302	310	318	325	333	340	348	355	363	371	378	386	393	401	408
74	148	155	163	171	179	186	194	202	210	218	225	233	241	249	256	264	272	280	287	295	303	311	319	326	334	342	350	358	365	373	381	389	396	404	412	420
75	152	160	168	176	184	192	200	208	216	224	232	240	248	256	264	272	279	287	295	303	311	319	327	335	343	351	359	367	375	383	391	399	407	415	423	431
76	156	164	172	180	189	197	205	213	221	230	238	246	254	263	271	279	287	295	304	312	320	328	336	344	353	361	369	377	385	394	402	410	418	426	435	443

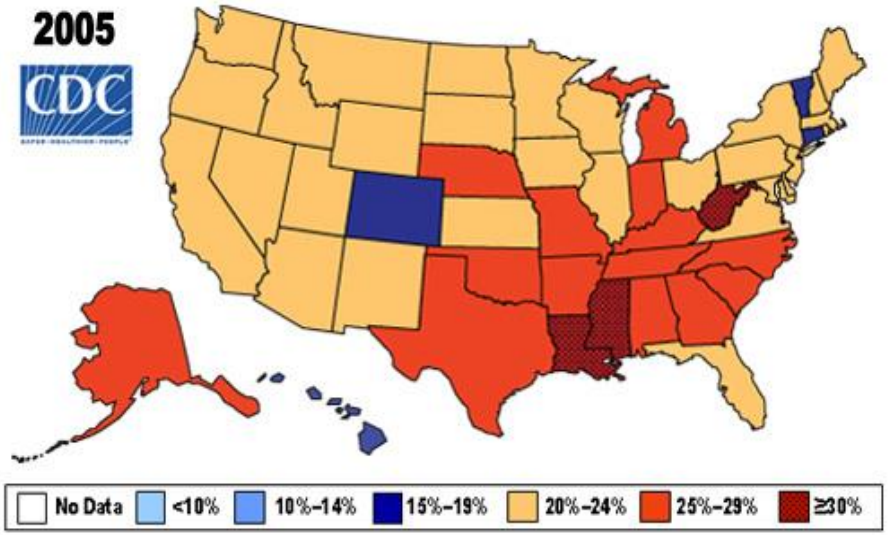
EX: 72 “ (6ft), weight is 235 lbs = 32 BMI, which is obese

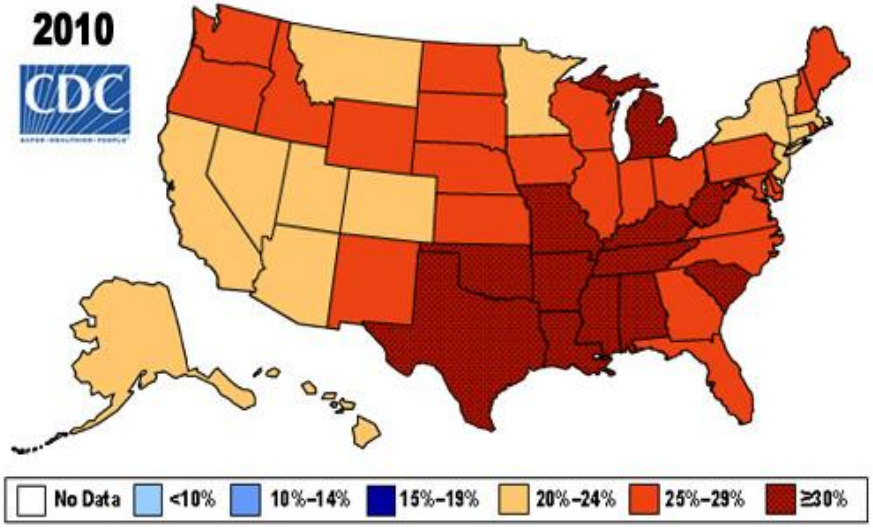
Source: Adapted from *Clinical Guidelines on the Identification, Evaluation, and Treatment of Overweight and Obesity in Adults: The Evidence Report.*

Obesity Statistics



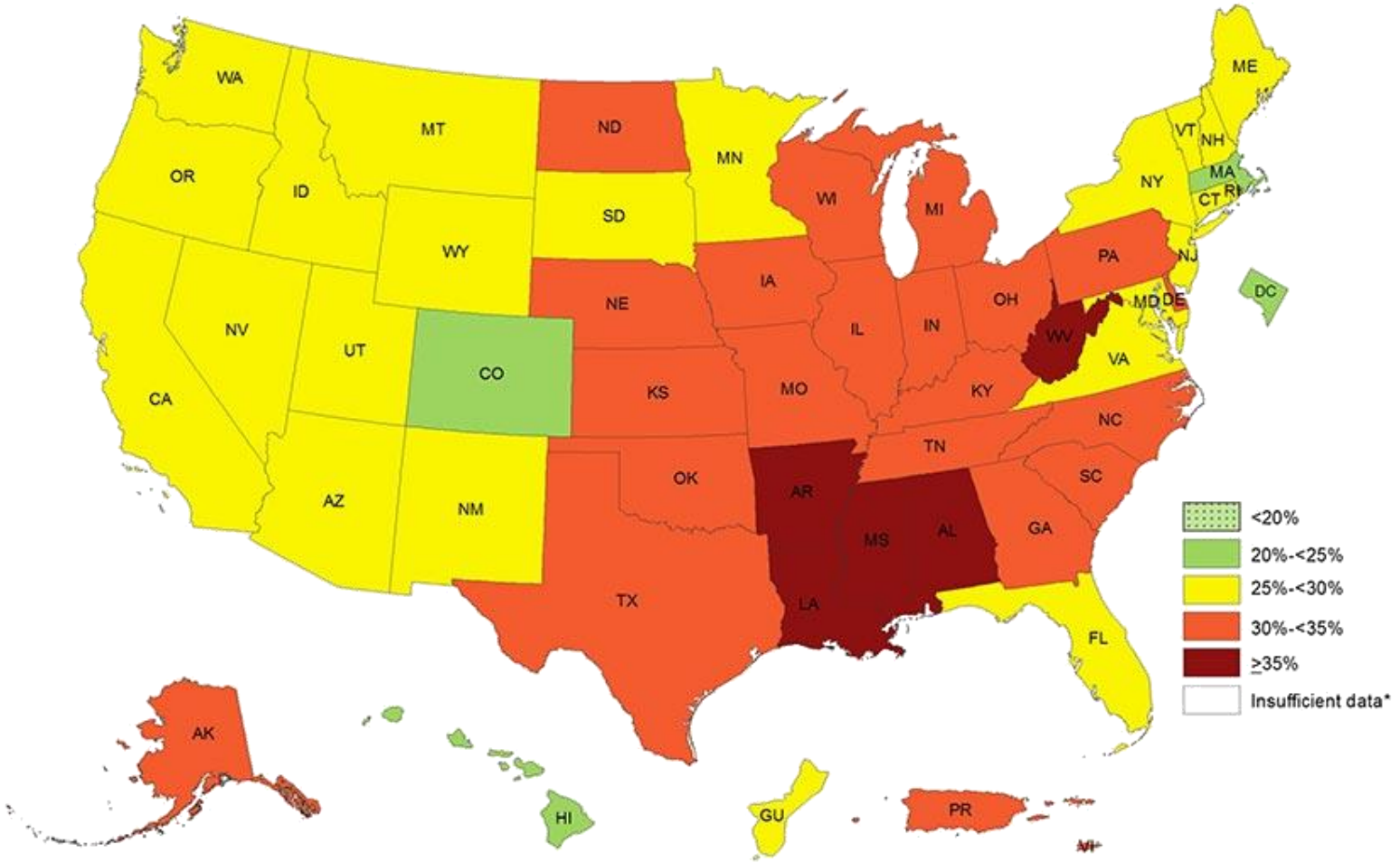






Source: CDC. Overweight & Obesity. Retrieved from https://www.cdc.gov/obesity/data/adult.html

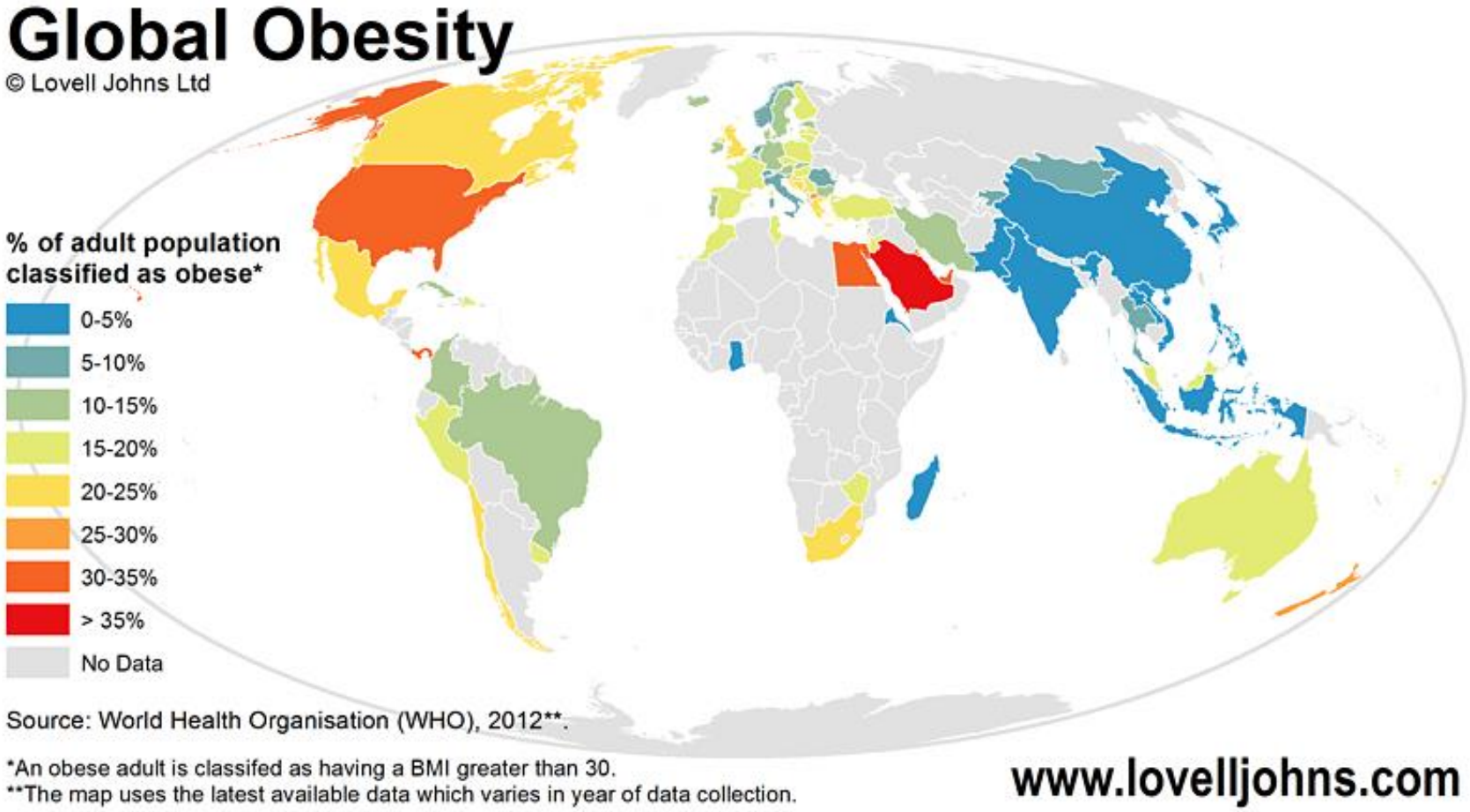
2016 Obesity Prevalence



No state had a prevalence of obesity less than 20%.

Source: CDC. Overweight & Obesity. Retrieved from https://www.cdc.gov/obesity/data/adult.html

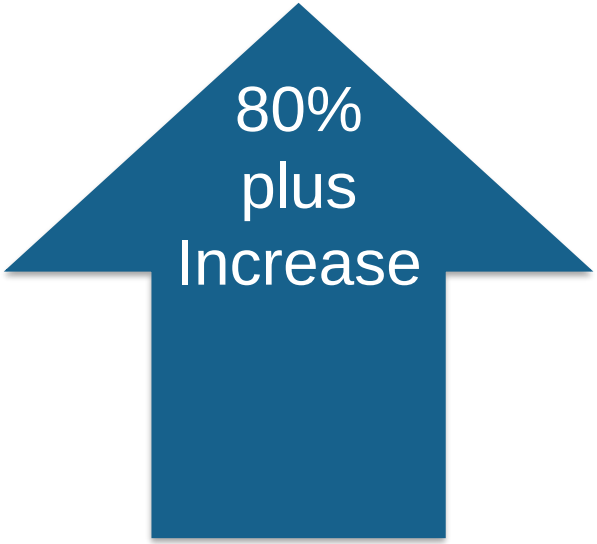
Worldwide Obesity



Obesity Supersizing Workers' Compensation Costs

1998: $78.5 B

2008: $147 B



Claims costs for obese workers were more expensive and involved **lost days of work**

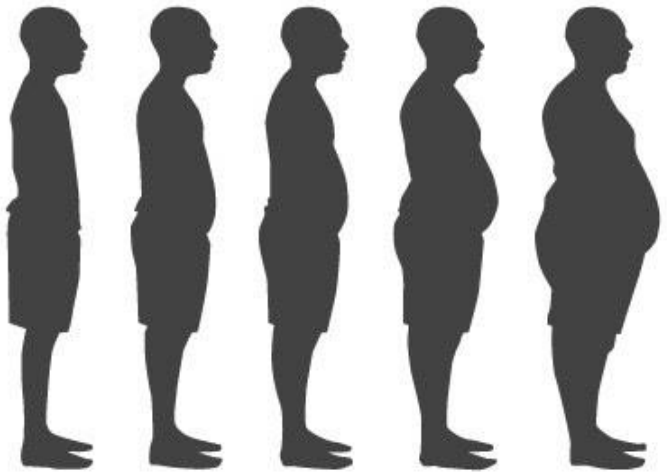
Obese workers sustained injures which resulted in **permanent-partial disability payments**

Obese workers were likely to have **permanent disability**

Source: Cunningham, P. (2011, January 02). Obesity: Supersizing Workers' Compensation Costs. Retrieved from: https://www.deflaw.com/blog/journal/workers-compensation/obesity-supersizing-workers-compensation-costs

Obesity Supersizing Workers' Compensation Costs

- 27% of increased medical costs directly related to obesity
- Medical spend is 29%-117% greater than normal weight
- $62.7 billion direct costs (medical)
- $56.3 billion indirect costs (includes lost work days)



Source: Cunningham, P. (2011, January 02). Obesity: Supersizing Workers' Compensation Costs. Retrieved from: https://www.deflaw.com/blog/journal/workers-compensation/obesity-supersizing-workers-compensation-costs

What is Obesity Costing the US Health Care System?

"Obesity is the leading driver in rising healthcare costs," says Kenneth Thorpe, chairman of the department of health policy and management at Emory University in Atlanta

$344 B

If Americans continue to pack on pounds, **obesity will eat up about 21% of the US health-care spend**

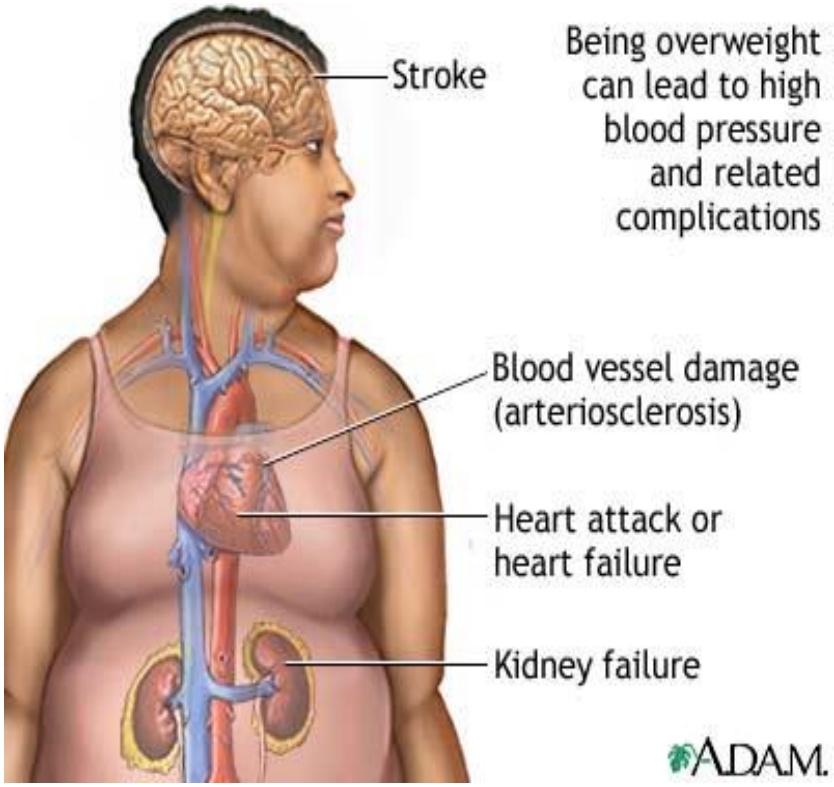
Source: Hellmich, N. (2009, Nov. 17). Rising Obesity Will Cost U.s. Health Care $344 Billion a Year. Retrieved from https://abcnews.go.com/Politics/rising-obesity-cost-us-health-care-344-billion/story?id=9106890

US Dept. of Health and Human Services
Obesity problems cost US businesses

>$13 billion every year

By 2030, obesity in the US is expected to reach **51% of Total Population**

Obesity



- Obese claims are 2.8 times more expensive than non-obese claims at the 12-month maturity
- This cost difference climbs to a factor of 4.5 times at the three year maturity and 5.3 at the five year maturity
- The cost difference at the five year maturity is less for females than for males

Source: Hoffman, B. (2013, March) The Business Of Obesity, What It Costs Us Retrieved from https://www.forbes.com/sites/bethhoffman/2013/03/22/the-business-of-obesity/#484265491099
Source: Retrieved from http://aia5.adam.com/content.aspx?productId=117&pid=1&gid=007297

CDC -Consequences of Obesity

All-causes of death (mortality)	Mental illness such as clinical depression, anxiety, and other mental disorders	Body pain and difficulty with physical functioning	Sleep apnea
Asthma	Diabetes	Breast, colon or endometrial cancers	Osteoarthritis
Coronary heart disease	High blood pressure	High cholesterol	Stroke

Osteoarthritis is the most common join disorder

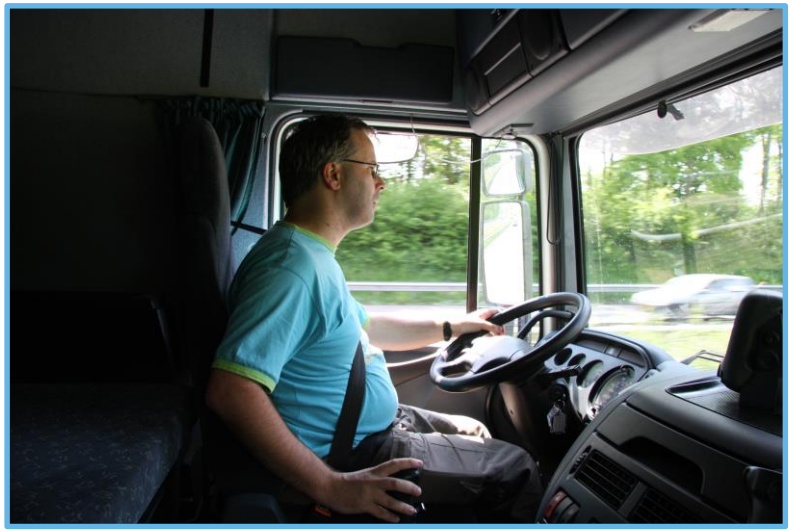
Hands	Hips	Knees	Neck	Back

10 extra pounds of weight increases the force on the knee by 30-60 pounds with each step

Source: Joint Pain is Strongly Associated with Body Weight. Retrieved from https://www.hopkinsarthritis.org/patient-corner/disease-management/role-of-body-weight-in-osteoarthritis/

Duke University Medical Center

- Findings when comparing non obese workers to obese workers:
  - Obese Workers:
    - Filed twice (2) as many work injury claims
    - Had seven (7) times higher medical costs for claims
    - Missed thirteen (13) more days of work from work injury or work illness



Body Weight and Cost Comparison

Claimant A

- 130 lbs
- Post-op infection
- Cubicin in 5mg/Kg/Q24 59Kg
- 5mg/Kg = 295 mg/day
- Cost @ $2.22/mg x 295mg = **$654.90/day**

Claimant B

- 330 lbs
- Post-op infection
- Cubicin in 5mg/Kg/Q24 150Kg
- 5mg/Kg = 750 mg/day
- Cost @ $2.22/mg x 750mg = **$1665.00/day**

Bariatric Equipment

Functional and Mobility Needs

Know Your Weight Limits

47 year old truck driver for construction company weighing 425 lbs; arrives at the yard and falls getting out of the truck. He is unable to get up & has injury to the lower extremity. Due to his size no one is able to assist him to a sitting position.

It is August in Florida and temperature is approaching 100 degrees. He is laying on the asphalt in the loading and unloading area. The IW is at risk for skin burns due to the temperature of the asphalt.

Fortunately, quick-thinking co-workers place blankets under the IW to avoid skin burns.

Ambulance is called and when they arrive they are unable to transport the IW due to his size. Bariatric size ambulance is called and the IW is transferred to the local hospital. On arrival the hospital is unable to accommodate his weight and the IW is diverted to a hospital with bariatric size stretchers and the ability to at least x-ray his lower extremity.

X-rays show non-displaced fractures, The IW is immobilized and sent home with instructions to follow up with Orthopedics on Monday.

The Bariatric Ambulance transports the IW back home which is close to 90 miles away. Once home the ambulance company is unable to gain access via any door in the home.

Physics just will not allow 68” wide stretcher through a 36” doorway.

The IW was subsequently transferred to acute care hospital until arrangement could be made to have heavy duty wheelchair, commode, transfer board and bed delivered and set up at local in-patient rehab center.

The IW did not need acute care hospitalization, nor did he need in-patient rehabilitation

Summary: The in-patient rehab had to remove all furniture from double occupancy room to accommodate bariatric equipment for this IW.

The carrier had to pay to purchase/rent these items. The rehab center wanted to charge the carrier double, since the IW was in essence, taking a space meant for 2 persons

Luckily, the IW was in the process of renovating his garage to a family room. Everything had been done to the garage except to remove the garage door and install AC.

Carrier agreed to pay for window Air conditioner unit. Once installed, the bariatric bed, wheelchair, commode were all delivered and set up in the garage and the IW was transported home to recover in his make-shift room in the garage.

The IW did very well, recovered at home and eventually resumed his position as a truck driver.

The Aging Workforce

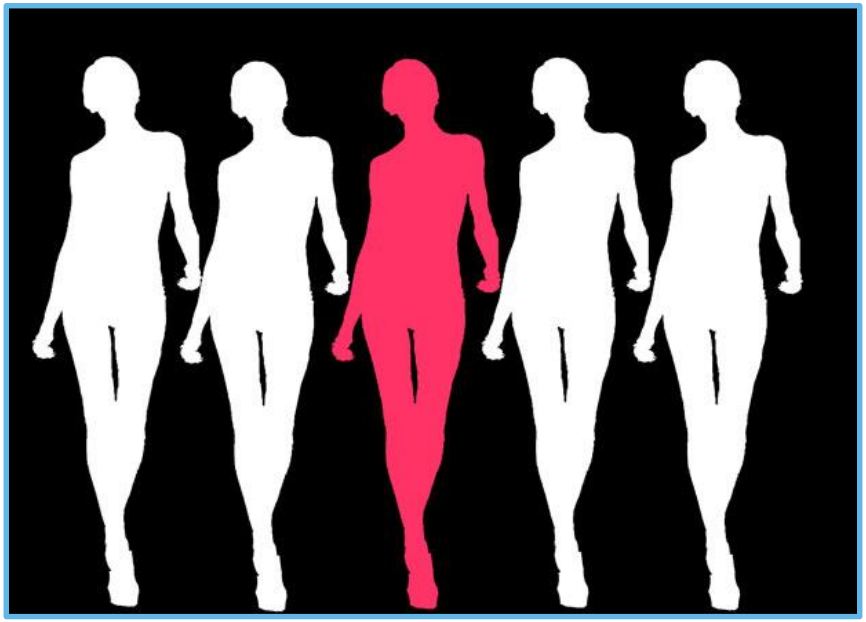
The Aging Workforce

Generational Shifts in Workforce

- **Traditionalists:** 1928-45, are expected to drop from 3 percent of the workforce in 2015 to 1 percent in 2020
- **Baby Boomers:** 1946-64, are expected to drop from 31 percent of the workforce in 2015 to 22 percent in 2020 (nearly 70 million are expected to retire by that time)
- **Generation X:** 1965-79, is expected to drop from 21 percent of the workforce in 2015 to 20 percent in 2020
- **Generation Y:** (also known as the Millennial generation), those born 1980-95, is expected to increase from 45 percent of the workforce in 2015 to 50 percent in 2020
- **Generation Z:** (also known as the Globals or the Gamer generation), those born 1996 and later, is expected to increase from 1 percent of the workforce in 2015 to 7 percent in 2020

2016: one in five American workers is over 65

2020: one in four will be over 55



Source: US Bureau of Labor Statistics. Retrieved from https://www.bls.gov/careeroutlook/2017/article/older-workers.htm

Older workers:

- Pose an increased risk for fatal work injuries
- Require more time to return to work following an injury or illness
- Are less likely to receive training as their jobs change

According to AARP:

- 69% of Baby Boomers plan to work past 65
- 50% expect to work past 70 and many expect to never retire

Source: Palmer, K. (2017, March 31). Many Workers Don't Think They'll Ever Retire retrieved from https://www.aarp.org/work/on-the-job/info-2017/workers-not-retiring-fd.html

Unretired Workers ages 50+

- Experienced
- Professional
- Good work ethic
- Lower turnover
- Vast knowledge base
- Enjoys the social aspects of work
- May outlive their savings

Highway Safety Challenge

Motor vehicle crashes account for 32% of all work-related deaths among workers age 55 or older

2020: **40 Million licensed drivers will be 65 years old**

Source: AAA. Retrieved from http://newsroom.aaa.com/wp-content/uploads/2012/11/SmartFeatures-FactSheet.pdf

Employers Role to Prevent Crashes

- Require use of seat belts
- Assess driving ability
- Promote safe driving
- Prevent Impaired driving
- Prevent distracted driving
- Fit for duty
- Pharmaceutical companies model “best practice” ride-along
- Supervisor rides with employee

- Factors that increase the aging workers potential for a fall include:
  - Muscle weakness, balance problems, vision problems, and side effects from medicines

- BLS states that older employees are **less likely to become injured on the job, but when they are injured, the injuries are more severe**

- In addition to the severe physical injuries, fear, anxiety, and depression often take a toll on the aging employee

Source: Bureau of Labor Statistics. Retrieved from https://www.bls.gov/opub/ted/2013/ted_20131230.htm?view_full

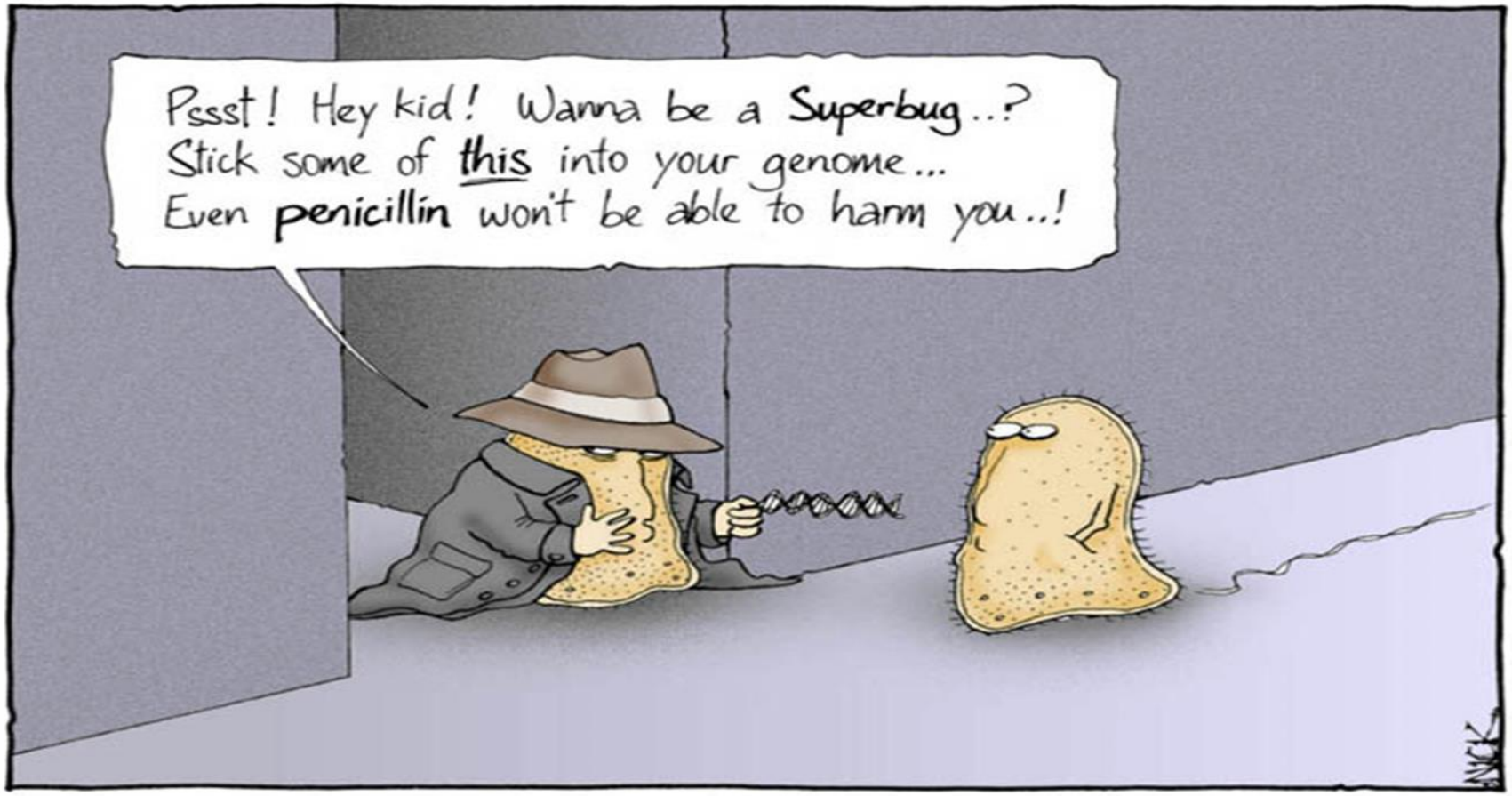
How are you minimizing the impact of comorbid conditions on claims?

Raise your hand and keep them raised if you're currently using the following strategies or thinking about implementing them?

A. Wellness Initiatives
B. Weight Management
C. Nutritional Counseling
D. Telephonic or Field Nurse Case Management
E. Discounts / Incentives for Gym Memberships
F. Targeted Safety Programs

Antibiotic Resistance

Antibiotic Resistant Infections



It was on a short-cut through the hospital kitchens that Albert was first approached by a member of the Antibiotic Resistance.

Infectious diseases continue to be a leading cause of death worldwide

- It is the **third** leading cause of death in the US
- Emergence of new infectious diseases
- Re-emergence of old infectious diseases
- Persistence of intractable infectious diseases

Source: Retrieved from https://www.cdc.gov/drugresistance/biggest_threats.html

Every year 2 million people become infected with antibiotic resistant bacteria

23,000 people die each year as a direct result of these infections

Source: Retrieved from https://www.cdc.gov/drugresistance/index.html

Community Acquired Infections

CDC Reports That These Are The Biggest Threats to the USA

- Clostridium Difficile (CDIFF)
  - Life-threatening diarrhea
- Carbapenem Resistant Enterobacteriaceae (CRE)
  - Almost half of hospital patients who get bloodstream infections from CRE bacteria die from the infection
- Neisseria gonorrhoeae
  - Causes gonorrhea, a sexually transmitted disease

Source: Retrieved from https://www.cdc.gov/drugresistance/biggest_threats.html

Bacterial Resistance to Antibiotics

- CDC estimates that approximately 50% of all antibiotic prescriptions are unnecessary
- The Institute of Medicine estimates that the annual cost of treating antibiotic resistant infections in the United States may be as high as $90 billion
- Doctors currently prescribe antibiotics for outpatients approximately 150 million times a year

Source: Retrieved from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4378521/
Source: Retrieved from https://www.cdc.gov/media/releases/2016/p0503-unnecessary-prescriptions.html

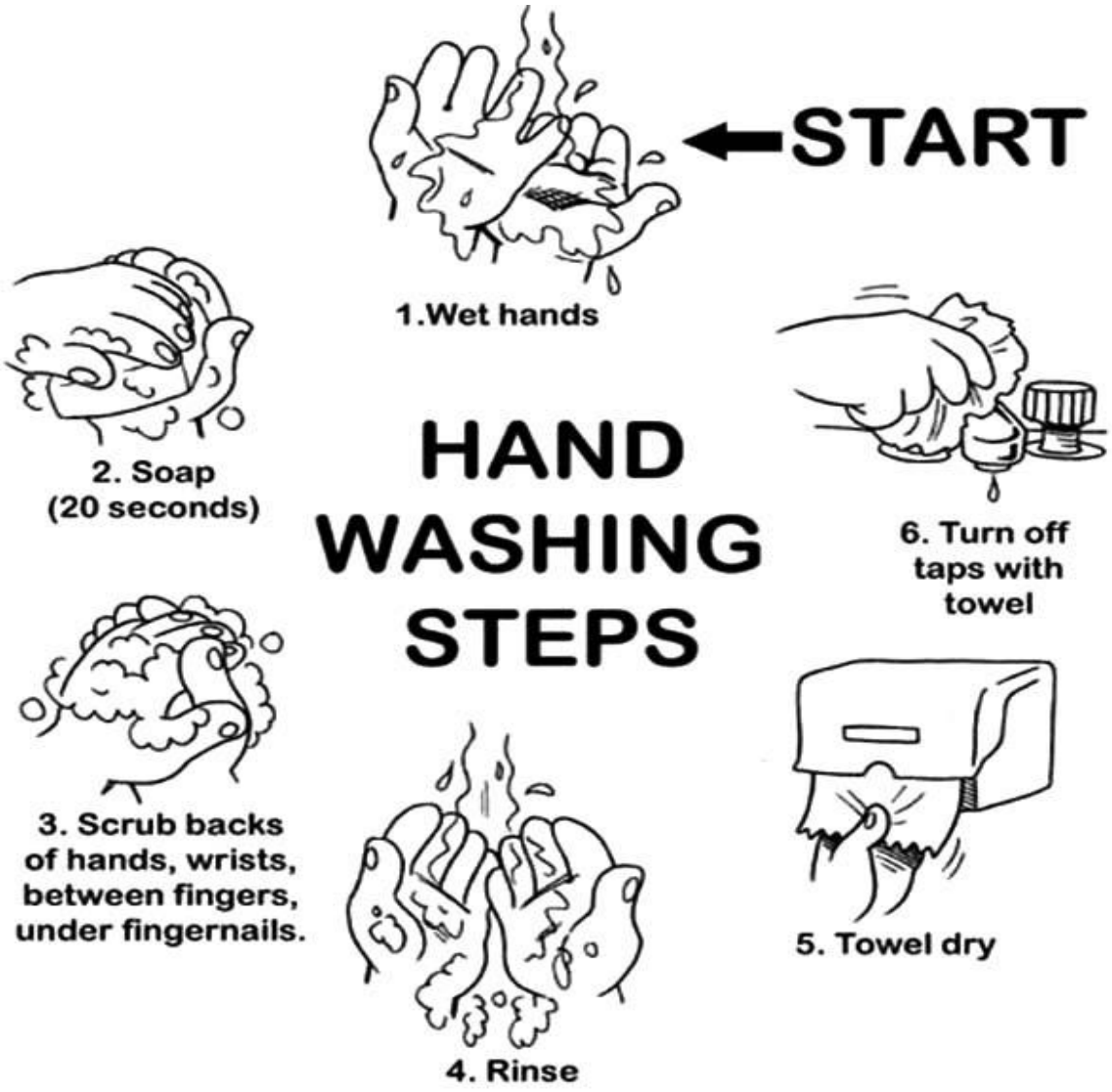
- Small Community Hospital – Labor and Delivery Unit has numerous MRSA infections with newborns and management shuts down unit to clean, paint and change out filters.
- One week later the unit re-opens after getting clean bill health from management as well as board of health.
- 5 days after unit opens 3 newborns come down with MRSA.
- The unit manager and hospital management go back to the basics they look at the admission process and determine that the first person who admits the patient is the admin who signs in patient, then takes her to her room, gets her settled with all necessary ADL needs.
- The same admin is also the one who takes the newborn photos once born.

- The management re-looks at the admin and noticed that she is wearing gel nails. MRSA was cultured from under her nails.
- Admin is removed from work and treated. She resumes work without gel nails and unit has not had anymore cases of MRSA.

Lesson:

- Had the unit only gone back to the basics and looked at the chain of infection they could have saved time and additional infections.

Washing Your Hands Best Defense



Some Defenses In Reducing The Resistance

- Changing prescribing patterns
  - Narrowing spectrum
  - Evaluating prophylactic use
- Government regulation of antibiotic use in livestock
- Centralized tracking of outbreaks
- New drug therapies
- Patient education
- Public health measures
- FDA Bans the sale of some Antibacterial Soaps – September 3, 2016

Source: New York Times. Retrieved from https://www.nytimes.com/2016/09/03/science/fda-bans-sale-of-many-antibacterial-soaps-saying-risks-outweigh-benefits.html

Thank you!

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References

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